



California Energy Commission

2014 Drought Effects on Natural Gas

Natural Gas Working Group Stakeholders Meeting
Hearing Room A

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Water and Energy are Related in California

- Hydro generation about 14% on average
- Larger concentration of hydro in North
- Hydro plants rely on snow melt
- Entering third drought year



Hydro Generation Not Only Use for Water

- Most state/federal reservoirs release for other purposes
- Generation is a by-product
- California SWRCB and FERC deciding on waivers
- Changes could affect generation levels



Natural Gas-Fired Plants Not Exempt From Water Use

- As hydro power reduced, more natural gas generation
- Gas plants require water for cooling, etc.
- Since 2003 IEPR, CEC has required back-up water
- Even dry cooling plants may need water
 - As little as 100AF per year



California Agencies Taking Drought Seriously

- CEC, CPUC, DWR, Governor's Office, SWRCB meeting weekly on energy issues
- Latest rainfall/snow improved hydro projections for 2014
- Very few natural gas plants have identified problems
- CEC working with jurisdictional plants to resolve



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Questions?